

notice have been purchased. Among them may be specially mentioned a specimen of the water-enclosing chalcedony from Brazil, enclosed in a gangue of igneous rock, and two remarkably fine crystals of epidote from Prince of Wales Island, Alaska.

Besides the services rendered by the salaried Museum Staff, the Curators would express their indebtedness to Messrs. Theodore D. Rand, Lewis Woolman, Philip P. Calvert and Charles Liebeck for aid in various departments, and to the students of the Jessup Fund, Messrs. E. G. Vanatta, J. A. G. Rehn, H. L. Viereck and Miss H. N. Wardle.

A large number of specialists have visited the Academy during the year for the purpose of studying the collections and material has been loaned to the following: J. Dwight, Jr., G. S. Miller, Jr., William Brewster, W. B. Scott, H. F. Osborn, W. T. Hornaday, T. Wayland Vaughan, J. N. Rose, M. W. Lyon, J. W. Gidley, Robert Ridgway, W. H. Dall, C. D. Beadle, H. C. Oberholser, B. G. Wilder, W. B. Clarke, F. A. Lucas, C. W. Richmond.

REPORTS OF THE SECTIONS.

BIOLOGICAL AND MICROSCOPICAL SECTION.

The regular monthly meetings of the Section have been held with an attendance larger than that of last year. Several new members have been admitted.

Numerous communications were made as follows: By Mr. John W. Palmer upon malarial fever in the Philippines and upon collections of diatoms made in the same locality; by Dr. T. S. Stewart upon smallpox and bacteria; by Dr. J. Cheston Morris upon various pathological subjects, including Texas fever and vaccine virus; by Mr. John A. Shulze upon mounted specimens of diatoms; by Mr. T. C. Palmer on *Trachelomonas*; Mr. Silas L. Schumo on Mosses; Mr. Hugo Bilgram and Mr. Harold Wingate on Myxomycetes; Mr. Lewis Woolman on microscopic organisms in recent artesian well borings, and Mr. William B. Davis and Mr. C. S. Boyer on diatoms.

The Conservator reports as an addition to the collection a set of microscopic slides illustrating the structure of the placenta in Marsupials, presented by Dr. Chapman.

It has been proposed to hold extra meetings upon certain stated evenings during the year, for informal discussion and for the exhibition of microscopical slides.

The following officers have been elected:

<i>Director</i>,	.	.	.	.	J. Cheston Morris, M.D.
<i>Vice-Director</i>,	.	.	.	.	T. Chalkley Palmer.
<i>Recorder</i>,	.	.	.	.	Charles S. Boyer.
<i>Corresponding Secretary</i>,	.	.	.	.	Silas S. Schumo.
<i>Conservator</i>,	.	.	.	.	F. J. Keeley.
<i>Treasurer</i>,	.	.	.	.	Lewis Woolman.

CONCHOLOGICAL SECTION.

The growth of the collection of mollusks during the year has been satisfactory, although no single large accession has been received. A list of those giving specimens will be found in connection with the *Additions to the Museum*. The chief gifts in point of extent were the series of Japanese mollusks sent by Mr. Y. Hirase, Zanzibar species from Sir Charles Eliot, and Carolinian land snails from Mr. J. H. Ferriss. The greater portion of the material has been studied and the work on a large part of it is embodied in papers published in the *Proceedings* of the Academy.

The completion of the monograph on Bulimulidæ has rendered possible the arrangement of that group in the Museum, where two double table-cases now contain the exhibition series. The work of identifying and monographing the Urocoptidæ is in progress. The *Manual of Conchology* has been issued during the year, as hitherto.

The following officers were elected to serve for the ensuing year:

<i>Director</i>,	.	.	.	.	Charles W. Johnson.
<i>Vice-Director</i>,	.	.	.	.	John Ford.
<i>Corresponding Secretary</i>,	.	.	.	.	E. G. Vanatta.
<i>Treasurer</i>,	.	.	.	..	S. Raymond Roberts.
<i>Librarian</i>,	.	.	.	.	Edward J. Nolan.
<i>Conservator</i>,	.	.	.	.	Henry A. Pilsbry.

ENTOMOLOGICAL SECTION.

The Recorder reports that the meetings of the Section, at which interesting communications were made, have been well attended during the year. One member and one associate were elected. The *Entomological News*, the journal published by the Section, has been continued, 334 pages and 15 plates having been issued. The collections have been useful to our own students, and a number of investigators from other scientific institutions have visited the Academy to study them. Over 37,000 specimens have been added during the year, 25,000 having been collected by an expedition sent out by the Academy. Many species new to science have been described by the members of the Section and a few have been sent to specialists elsewhere for study and description. The collections are in a good state of preservation and improved boxes and cabinets have been added. Additional floor space has been granted and enclosed by the Academy to provide for the growth of the Section. At the annual meeting, held December 18, the following were elected to serve as officers during the year 1903:

<i>Director</i> ,	Philip Laurent.
<i>Vice-Director</i> ,	H. W. Wenzel.
• <i>Treasurer</i> ,	E. T. Cresson.
<i>Recorder and Conservator</i> ,	Henry Skinner.
<i>Secretary</i> ,	C. W. Johnson.
<i>Publication Committee</i> ,	C. W. Johnson, J. H. Ridings.

BOTANICAL SECTION.

Accessions to the herbarium fully up to those of former years are reported. About 6,000 specimens, principally North American, have been received, the greater number being donations.

The most important of these is a collection of Western American plants, consisting of 1,925 species and numbering considerably over 2,000 mounted sheets, representing most of the characteristic genera and a large number of the species of the Rocky Mountain region, presented by Mr. Benjamin H. Smith, the collection having been made by him some years ago while living in that district. It comprises, besides plants of his own collecting, those of Pringle,

Suksdorf, Howell and others, many of the sheets being annotated by the late Dr. Porter, thus adding considerably to their interest and value. The collection includes a number of species and several genera not before represented in the herbarium.

A collection of 430 California and Oregon plants, made by Mr. H. E. Brown, was presented by the Conservator.

A collection of about 800 North American plants was presented early in the year by Mr. William M. Canby. They represent nearly all regions from the east coast to the west, including Georgia, Florida, the Gulf States and part of Mexico. The collection contains a number of recently named species, notably of *Cratægus*, not already contained in the herbarium.

A collection of about 100 specimens, of similar range of localities, was presented by Prof. Charles S. Williamson.

Smaller collections have been presented by Prof. E. A. Garratt, from British Columbia; by C. F. Saunders, from Vermont, and by E. G. Vanatta, from Maryland.

An interesting collection of about 130 specimens, made in the vicinity of Sandwich Bay, Labrador, during the past summer, was presented by Dr. Amos P. Brown.

A collection of West Indian plants, presented by Dr. John W. Harshberger, was collected by him in Jamaica, Haiti and Santo Domingo in 1901.

Messrs. James A. G. Rehn and H. L. Viereck, of the Academy's expedition to southwestern Texas and New Mexico, early in the year, brought back a good series of about 2,000 specimens of the plants of that region. The collection is particularly rich in the Cacti, of which most excellent examples were obtained. It adds a number of desirable forms to the collection, and when thoroughly studied will probably add several species to science.

The collections purchased by the Academy include about 900 specimens of California plants received from Mr. A. A. Heller, made by himself and Mr. H. E. Brown during the past season; 540 West Australian plants from Dr. Pritzel, and about 350 Canary Island plants from Dr. Bornmüller.

Most of these specimens have been mounted and consolidated with the general collection, and the others will be similarly arranged at as early a date as possible.

The work of arranging the C. W. Short Herbarium has pro-

gressed satisfactorily during the year, about 15,000 sheets having been mounted, completing the work through the Scrophulariaceæ. These specimens have been incorporated in the general collections, thus in many instances crowding the cases, so that additional room is required.

The local herbarium of the Philadelphia Botanical Club has been enriched by donations from its members aggregating about 500 specimens.

The meetings of the Section, at which a number of communications of scientific interest have been presented, have been held regularly during the year.

At the meeting held December 8, 1902, the following were elected to serve as officers for the ensuing year:

<i>Director</i> ,	Benjamin H. Smith.
<i>Vice-Director</i> ,	Joseph Crawford.
<i>Recorder</i> ,	Dr. Ida A. Keller.
<i>Corresponding Secretary</i> ,	John T. Pennypacker.
<i>Treasurer and Conservator</i> ,	Stewardson Brown.

MINERALOGICAL AND GEOLOGICAL SECTION.

The Director reports that nine meetings were held, with an average attendance of eight members. Six field meetings were held, at which the attendance was large. Some of the specimens collected were given to the Academy.

The officers elected for the ensuing year are as follows:

<i>Director</i> ,	Theodore D. Rand.
<i>Vice-Director</i> ,	Benjamin Smith Lyman.
<i>Treasurer</i> ,	Emma Walter.
<i>Conservator</i> ,	F. J. Keeley.
<i>Recorder</i> ,	Charles Schäffer, M.D.

ORNITHOLOGICAL SECTION.

During the past year the Conservator has completed the arrangement of the mounted birds on the new ornithological floor, so far as the case-room will permit. The four large cases and three small ones now in place cover about 900 square feet of floor space and accommodate almost all of the water-birds and the majority of

the Gallinaceæ, or approximately half of the mounted collection, so far as space occupied is concerned.

The specimens transferred during the year have all been labelled and have been carefully examined by the taxidermist, while the entire series has been rearranged to bring it into systematic sequence.

Several old horizontal cases have been renovated and placed on the ornithological floor for the accommodation of a special collection, prepared for exhibition by the Conservator, illustrating the structure and molt of birds.

The opening of this department to the public, unavoidably postponed, will take place early in the coming year.

Two additional large wooden storage cases and sixteen tin cases were provided for the accommodation of the rapidly increasing study collection of skins, and much important work has been accomplished in transferring the specimens to the new cases and in properly labelling the trays to aid in their examination. For this, as well as aid in cataloguing the collection, the Conservator is much indebted to Mr. J. A. G. Rehn.

Several valuable additions have been made to the collection of birds during the year, notably the beautiful series of specimens from Sumatra, collected and presented by Mr. Alfred C. Harrison, Jr., and Dr. H. M. Hiller, containing many forms new to the collection.

A collection of the birds of the Galapagos Islands was purchased through subscriptions by members of the Academy. This material fills an important gap in our collection, as the Academy previously possessed no specimens from this region. An interesting series of New Mexican birds was collected by Mr. Rehn while on the expedition sent out by the Academy in the spring, and many other specimens were received through gift or purchase.

The Delaware Valley Ornithological Club and the Pennsylvania Audubon Society have continued to hold their meetings in the Academy, and have done much to stimulate ornithological study. By invitation the American Ornithologists' Union has arranged to hold its twenty-first Congress at the Academy in November, 1903.

Many visiting ornithologists have made use of the collections during the year, and considerable aid has been given to workers in other institutions.

At the annual meeting of the Section, December 18, 1902, the following officers were chosen for the ensuing year:

<i>Director</i> ,	Spencer Trotter, M.D.
<i>Vice-Director</i> ,	George Spencer Morris.
<i>Secretary</i> ,	William A. Shryock.
<i>Recorder</i> ,	Stewardson Brown.
<i>Treasurer and Conservator</i> ,	Witmer Stone.

The election of Officers, Councilors and Members of the Committee on Accounts to serve during 1903 was held with the following result:

PRESIDENT,	Samuel G. Dixon, M.D.
VICE-PRESIDENTS,	Arthur Erwin Brown, Edwin G. Conklin, Ph.D.
RECORDING SECRETARY,	Edward J. Nolan, M.D.
CORRESPONDING SECRETARY,	J. Percy Moore, Ph.D.
TREASURER,	George Vaux, Jr.
LIBRARIAN,	Edward J. Nolan, M.D.
CURATORS,	Henry C. Chapman, M.D., Arthur Erwin Brown, Samuel G. Dixon, M.D., Henry A. Pilsbry, D.Sc.
COUNCILORS TO SERVE THREE YEARS,	Thomas A. Robinson, Charles H. Cramp, Charles Morris, Isaac J. Wistar.
COMMITTEE ON ACCOUNTS,	Charles Morris, William L. Baily, Harold Wingate, Lewis Woolman, Philip P. Calvert, Ph.D.
COUNCILORS TO SERVE UNEXPIRED TERM OF TWO YEARS,	Edwin S. Dixon, Thomas H. Fenton, M.D.